

# United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/665,772	09/19/2003	Shuji Inoue	9432-000237	6372
	7590 04/05/2007 CKEY & PIERCE, P.L.C	EXAMINER		
P.O. BOX 828 BLOOMFIELD HILLS, MI 48303			PARK, JEONG S	
			ART UNIT	PAPER NUMBER
			2109	
SHORTENED STATUTOR	Y PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE	
3 MO	NTHS	04/05/2007	PAPER	

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

		/ V 4				
	Application No.	Applicant(s)				
	10/665,772	INOUE ET AL.				
Office Action Summary	Examiner	Art Unit				
	Jeong S. Park	2109				
The MAILING DATE of this communication app Period for Reply	ears on the cover sheet with the c	orrespondence address				
A SHORTENED STATUTORY PERIOD FOR REPLY WHICHEVER IS LONGER, FROM THE MAILING DA  - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication.  - If NO period for reply is specified above, the maximum statutory period w  - Failure to reply within the set or extended period for reply will, by statute, Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	ATE OF THIS COMMUNICATION 36(a). In no event, however, may a reply be tim will apply and will expire SIX (6) MONTHS from cause the application to become ABANDONE	N. nely filed the mailing date of this communication. D (35 U.S.C. § 133).				
Status						
1) Responsive to communication(s) filed on 19 Se	<u>eptember 2003</u> .					
2a) ☐ This action is FINAL. 2b) ☒ This						
3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is						
closed in accordance with the practice under E	x parte Quayle, 1935 C.D. 11, 45	53 O.G. 213.				
Disposition of Claims						
4) Claim(s) 1-39 is/are pending in the application.	•					
4a) Of the above claim(s) is/are withdrawn from consideration.						
5) Claim(s) is/are allowed.						
<u> </u>	6) Claim(s) <u>1-39</u> is/are rejected.					
7) Claim(s) is/are objected to. 8) Claim(s) are subject to restriction and/or	election requirement					
are subject to restriction and/or	·					
Application Papers						
9) The specification is objected to by the Examiner		•				
10)⊠ The drawing(s) filed on <u>19 September 2003</u> is/are: a) accepted or b)⊠ objected to by the Examiner.						
Applicant may not request that any objection to the or Replacement drawing sheet(s) including the correction	• • • • • • • • • • • • • • • • • • • •					
11) The oath or declaration is objected to by the Ex	• • • • • • • • • • • • • • • • • • • •					
Priority under 35 U.S.C. § 119						
12) Acknowledgment is made of a claim for foreign	nriority under 35 H.S.C. & 119(a)	h-(d) or (f)				
a) All b) Some * c) None of:	priority direct 55 0.0.0. § 115(a)	-(u) or (1).				
1. Certified copies of the priority documents	s have been received.					
2. Certified copies of the priority documents		on No				
<ol><li>Copies of the certified copies of the prior</li></ol>	ity documents have been receive	ed in this National Stage				
application from the International Bureau	· · · · · · · · · · · · · · · · · · ·	)				
* See the attached detailed Office action for a list of	of the certified copies not receive	d.				
Attachment(s)  1) Notice of References Cited (PTO-892)	' A)  lateaulaus Curannan	(PTO 412)				
2) Notice of Draftsperson's Patent Drawing Review (PTO-948) Paper No(s)/Mail Date.						
3) Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date <u>See Continuation Sheet.</u>	5)  Notice of Informal P 6) Other:	atent Application				

Continuation of Attachment(s) 3). Information Disclosure Statement(s) (PTO/SB/08), Paper No(s)/Mail Date :9/19/2003, 2/23/2004, 3/1/2004, 5/24/2004, 6/14/2004, 6/18/2004.

Art Unit: 2109

#### **DETAILED ACTION**

### **Drawings**

1. The drawings are objected to because:

There is no reference character for "MPEG-7 SERVER" in figure 1.

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

# Claim Objections

2. Claims 1-25 and 27-39 are objected to because of the following informalities:

In claim 1, line 5, the phrase "the operation requests" should be corrected as – operation requests-- for clear understanding of the claim;

Art Unit: 2109

In claim 1, line 6, the word "the devices" should be corrected as –the one or more devices-- for clear understanding of the claim;

In claim 1, line 7, the phrase "the load characteristics" should be corrected as -- load characteristics-- for clear understanding of the claim;

In claim 2, line 1, the phrase "a resource manager" should be corrected as –the resource manager-- for clear understanding of the claim;

In claim 3, line 1, the phrase "a resource manager" should be corrected as –the resource manager-- for clear understanding of the claim;

In claim 4, line 2, the word "the devices" should be corrected as –the one or more devices-- for clear understanding of the claim;

In claim 5, line 2, the word "the devices" should be corrected as –the one or more devices-- for clear understanding of the claim;

In claim 7, line 1, the phrase "load characteristics" should be corrected as –the load characteristics-- for clear understanding of the claim;

In claim 7, lines 2-3, the word "the devices" should be corrected as –the one or more devices-- for clear understanding of the claim;

In claim 8, line 1, the word "the devices" should be corrected as –the one or more devices-- for clear understanding of the claim;

In claim 8, line 2, the word "a camera" should be corrected as –the camera-- for clear understanding of the claim;

In claim 19, line 2, the phrase "a source camera identifier" should be corrected as —the source camera identifier — for clear understanding of the claim;

Art Unit: 2109

In claim 21, line 2, the word "an identity" should be corrected as –the identity-- for clear understanding of the claim;

In claim 21, line 2, the word "a location" should be corrected as –the location-- for clear understanding of the claim;

In claim 25, line 2, the word "a user" should be corrected as –the one or more users-- for clear understanding of the claim;

In claim 27, lines 6 and 8, the phrase "the network resources" should be corrected as –the one or more network resources-- for clear understanding of the claim;

In claim 29, line 1, the word "a schedule" should be corrected as –the schedule-for clear understanding of the claim;

In claim 30, line 1, the phrase "the network resources" should be corrected as – the one or more network resources-- for clear understanding of the claim;

In claim 31, line 2, the word "a the network" should be corrected as –a network-for clear understanding of the claim;

In claim 33, line 1, the phrase "load characteristics" should be corrected as –the load characteristics-- for clear understanding of the claim;

In claim 35, line 2, the phrase "the network resources" should be corrected as – the one or more network resources-- for clear understanding of the claim;

In claim 36, line 2, the phrase "the network resources" should be corrected as – the one or more network resources-- for clear understanding of the claim;

In claim 38, line 2, the word "the users" should be corrected as –the one or more users-- for clear understanding of the claim; and

In claim 39, line 2, the phrase "the network resources" should be corrected as – the one or more network resources—for clear understanding of the claim.

Appropriate correction is required.

### Claim Rejections - 35 USC § 101

3. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

4. Claims 1-25 and 27-39 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

Claim 1 is drawn towards a resource manager for a security system comprising one or more devices for collecting and/or managing data, one or more users for submitting operation requests, and a controller for receiving, determining, and allocating the devices. This can be just an abstract idea. In order for an abstract claim to be statutory, it must result in useful, concrete, and tangible results. The final result achieved by the claimed invention does not produce any tangible result.

Claims 2-25, which are dependent on claim 1, do not add any tangible results to the claim and thus are rejected for the same.

Claim 27 is drawn towards a method for allocating resources comprising collecting data, submitting requests, determining load characteristics, and allocating the network resources. This can be just an abstract idea. In order for an abstract claim to be statutory, it must result in useful, concrete, and tangible results. The final result achieved by the claimed invention does not produce any tangible result.

Art Unit: 2109

Claims 28-39, which are dependent on claim 27, do not add any tangible results to the claim and thus are rejected for the same.

## Claim Rejections - 35 USC § 102

5. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

- (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.
- 6. Claims 1, 2, and 8-29 are rejected under 35 U.S.C. 102(b) as being anticipated by Ewert et al. (hereinafter Ewert)(U.S. Patent Pub. No. 2001/0034586 A1).

Regarding claims 1 and 27, Ewert teaches as follows:

A resource manager or a method for a security system network (a system for monitoring a property and controlling electrical devices located at the property via a network, see, e.g., page 1, paragraph [0004], lines 1-3) comprising;

One or more devices for collecting (I/O devices for collecting data, reference character 12 in figure 1) and/or managing data (controller for managing the data, reference character 10 in figure 1) from an environment (see, e.g., page 1, paragraph [0018]);

One or more users (user, reference character 22 in figure 1) that submit operation requests for the data (see, e.g., page 1, paragraph [0017]); and

A controller (controller, reference character 10 in figure 1) that receives the operation requests (controller adapted to receive a request from the network, see, e.g., page 1, paragraph [0004]) determines load characteristics of the devices (controller

Art Unit: 2109

receives unsolicited messages which provides status updates on the functions of various I/O hardware, see, e.g., page 2, paragraph [0032]) and allocates the devices to the operation requests according to the load characteristics (controller forward requests from the user to I/O hardware which means the I/O hardware has been allocated to the requests, see, e.g., page 2, paragraph [0031]).

Regarding claims 2, Ewert teaches that the controller generates allocation requests that attempt to allocate the operation requests to the devices in response to the operation requests (controller forward requests from the user to I/O hardware which means the I/O hardware has been allocated to the requests, see, e.g., page 2, paragraph [0031]).

Regarding claim 8, Ewert teaches that the devices include a camera that collects multimedia data (I/O devices including digital or analog camera to monitor current images, see, e.g., page 2, paragraph [0018]).

Regarding claim 9, Ewert teaches that the camera streams the multimedia data in one or more media formats (GRABD, reference character 30 in figure 2, converts the image to a standard format such as JPEG, see, e.g., page 2, paragraph [0029]).

Regarding claim 10, Ewert teaches that the resource manager comprising a multimedia recorder (data storage device, reference character 14 in figure 1) that records the multimedia data (data storage device stores information from I/O devices, see, e.g., page 1, paragraph [0018], lines 1-8).

Regarding claim 11, Ewert teaches that the multimedia recorder plays the multimedia data in response to the operation requests (the user can monitor recorded

Art Unit: 2109

information from the data storage device, see, e.g., page 1, paragraph [0018], lines 14-20).

Regarding claim 12, Ewert teaches that the resource manager comprising an analyzer server (GRABD, IFXD, CONTROLD components, reference characters 30, 34, 32 respectively in figure 2, working as an analyzer server) that collects meta-data (list of files) from the multimedia data (IFXD responds with a list of files which is colleted from the stored image data, see, e.g., page 3, paragraph [0037]).

Regarding claim 13, Ewert teaches that the analyzer server collects the metadata (indication of the image resolution) directly from the camera (GRABD captures images from one or more cameras indicating the desired resolution of the images, see, e.g., page 2, paragraph [0029]).

Regarding claim 14, Ewert teaches that the analyzer server collects the metadata from the multimedia recorder (IFXD responds with a list of files stored in the data storage device, see, e.g., page 3, paragraph [0037]).

Regarding claim 15, Ewert teaches that a meta-data server (data storage device, reference character 50 in figure 2) that stores the meta-data (reason for doing so is interpreted as a meta-data)(IFXD capture an image from a particular camera and a reason for doing so and stores in the data storage device, see, e.g., page 3, paragraph [0033], lines 14-22).

Regarding claim 16, Ewert teaches that the operation requests include searching the meta-data server (data storage device) for meta-data (requests can be sent to IFXD for image that satisfy various criteria such as times, reasons, channels, and the like,

Art Unit: 2109

wherein the image is stored at the data storage device, see, e.g., page 3, paragraph [0034]).

Regarding claim 17, Ewert teaches that the operation requests include:

Record requests (in response to the request IFXD captures images and save them to a data storage, see, e.g., page 3, paragraph [0034]);

Analysis requests (requests can be sent to IFXD for image that satisfy various criteria such as times, reasons, channels, and the like, see, e.g., page 3, paragraph [0034]);

Play requests (user to view in real time the current status including audio and video surveillance, see, e.g., page 1, paragraph [0005], lines 4-7); and

Search requests (provide a list of files that satisfies the request, see, e.g., page 3, paragraph [0037], lines 5-10).

Regarding claim 18, Ewert teaches that the record requests include at least one of a source camera identifier, a media recording format, a recording purpose, and a duration of recording (requests can be sent to IFXD for image that satisfy various criteria such as times, reasons, channels, and the like, see, e.g., page 3, paragraph [0034]).

Regarding claim 19, Ewert teaches that the analysis request includes a source camera identifier (requested camera) and a duration (a single or a sequence of frame) of analysis (GRABD captures an image from the requested camera and the image may be a single frame or a sequence of frame taken at a particular interval, see, e.g., page 3, paragraph [0038], lines 1-8).

Art Unit: 2109

Regarding claims 20 and 21, Ewert teaches that the analysis and play requests include an identity and a location of a multimedia file (request for images can be directly sent to GRABD for current images from the cameras or sent to IFXD for stored images from the data storage device, see, e.g., page 3, paragraph [0037]).

Regarding claim 22, Ewert teaches that the resource manager comprising an Internet gateway server (HTTPD component, reference character 38 in figure 2) that connects the users to the security system network (HTTPD is run in response to user requests via a network using a web browser, see, e.g., page 3, paragraph [0036], lines 1-5 and figure 1).

Regarding claims 23 and 28, Ewert teaches that the controller generates a schedule for the requests based on the load characteristics (requests may be made at any periodic interval in order to create a desired storage history such as once per second, once per minute, once per hour or any other increment, see, e.g., page 3, paragraph [0042], lines 6-9).

Regarding claims 24 and 29, Ewert teaches that the controller prioritizes the operation requests (multiple requests are formulated in the appropriate manner and forwarded to other components of the system, see, e.g., page 3, paragraph [0036]).

Regarding claim 25, Ewert teaches that the operation requests are generated by one of a user (see, e.g., page 1, paragraph [0017]), an alarm (detection of an event may trigger a request for an image to be taken by a camera, see, e.g., page 3, paragraph [0040], lines 8-11), and a scheduled event (requests may be made at any periodic

Art Unit: 2109

interval in order to create a desired storage history, see, e.g., page 3, paragraph [0042], lines 6-9).

Regarding claim 26, Ewert teaches that a resource manager for a security system network comprising:

A camera that collects multimedia data (I/O devices including digital or analog camera to monitor current images, see, e.g., page 2, paragraph [0018]);

A multimedia recorder that stores the multimedia data (data storage device stores information from I/O devices, see, e.g., page 1, paragraph [0018], lines 1-8);

An analyzer that extracts meta-data (list of files) from the multimedia data (IFXD responds with a list of files which is colleted from the stored image data, see, e.g., page 3, paragraph [0037]);

One or more users that submit operation requests for the data (see, e.g., page 1, paragraph [0017]); and

A controller that receives the operation requests, communicates with the camera, the multimedia recorder, and the analyzer to determine load characteristics (controller receives unsolicited messages which provides status updates on the functions of various I/O hardware, see, e.g., page 2, paragraph [0032]), and allocates the operation requests according to the load characteristics (controller forward requests from the user to I/O hardware which means the I/O hardware has been allocated to the requests, see, e.g., page 2, paragraph [0031]).

Application/Control Number: 10/665,772 Page 12

Art Unit: 2109

### Claim Rejections - 35 USC § 103

7. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

- (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 8. Claims 3-7 and 30-39 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ewert et al. (hereinafter Ewert)(U.S. Patent Pub. No. 2001/0034586 A1) as applied to claims 1, 2, and 8-29 above, and further in view of Nozaki (U.S. Patent No. 6,128,644).

Regarding claims 3, 4, 7, and 33-35, Ewert discloses as follows:

The controller generates the load characteristics (controller receives unsolicited messages which provides status updates on the functions of various I/O hardware, see, e.g., page 2, paragraph [0032]).

Ewert does not disclose the detail content of the load characteristics in the graphical representation form.

Nozaki disclose as follows:

A load distribution system, a server status management (reference character 5a in figure 1) obtains the amount of processing of each server collected by the server status notification (reference characters 3a, 4a in figure 1) to manage a load status of each server (see, e.g., abstract and figure 1); and

A server status management table (reference character 123a in figure 6) includes representative DNS, individual DNS (location of the devices), load (current media flow

Art Unit: 2109

of the devices), ratio, and status (availability of the devices)(see, e.g., col. 9, line 56 to

col. 10, line 18).

It would have been obvious for one of ordinary skill in the art at the time of the invention to modify Ewert to include a graphical representation of the load status of each server as taught by Atkins in order to present efficiently and clearly the information to users.

Regarding claims 5 and 6, Ewert discloses all the limitations of claim as explained above except for the media flow data including a source identifier, a media format, a media bandwidth requirement, a multi-cast address, and a service identifier

Nozaki disclose that there is stored load or packets per unit time being processed by a corresponding server having an individual DNS name (see, e.g., col. 10, lines 3-6).

It would have been obvious for one of ordinary skill in the art at the time of the invention to modify Ewert to include the media flow data information as taught by Atkins in order to present efficiently and clearly the information to users.

Regarding claims 30-32, Ewert discloses all the limitations of claim as explained above except for disclosing the detail steps.

Nozaki disclose as follows:

Determining a set of candidate devices (list individual DNS names of respective servers integrated into, see, e.g., col. 9, line 66 to col. 10, line 3);

Assigning scores (relative amount of processing) to each candidate device in the set, and communicating with the candidate devices according to the scores (see, e.g., col. 10 lines 25-45).

Art Unit: 2109

Calculating the scores according to a current load, a location on the network, and existing media flows (the relative amount of processing is obtained by dividing the "load" value" by the "ratio" value, see, e.g., col. 10 lines 25-45); and

Determining availability of the candidate devices ("status" shows the operating status of each respective server, see, e.g., col. 10 lines 15-18).

It would have been obvious for one of ordinary skill in the art at the time of the invention to combine Ewert to include the detail steps of determining candidate devices as taught by Atkins in order to communicate with the reliable devices.

Regarding claims 36 and 37, Ewert discloses all the limitations of claim as explained above except for determining costs of allocating the network resources and storing the costs in a matrix.

Nozaki disclose that determining costs of allocating the network resources (the relative amount of processing is obtained by dividing the "load" value" by the "ratio" value and makes the determination to send the request to the more efficient server, see, e.g., col. 10 lines 25-45).

It would have been obvious for one of ordinary skill in the art at the time of the invention to combine Ewert to include determining costs of allocating network resources as taught by Atkins in order to communicate with the reliable and cost-efficient network resources.

Regarding claims 38 and 39, Ewert discloses all the limitations of claim as explained above except for generating a set of rules and allocating the network resources according to the set of rules.

Application/Control Number: 10/665,772 Page 15

Art Unit: 2109

Nozaki disclose that generating a set of rules (sending to the lower relative amount of processing) and allocating the network resources according to the set of rules (calculating the relative amount of processing and allocating to the lower relative amount of processing server, see, e.g., col. 10 lines 25-45).

It would have been obvious for one of ordinary skill in the art at the time of the invention to combine Ewert to include determining a set of rule for allocating as taught by Atkins in order to communicate systematically and reliably based on the network environment.

#### Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jeong S. Park whose telephone number is 571-270 The examiner can normally be reached on Monday through Thursday 7:30 - 5:00 EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Frantz Jules can be reached on 571-272--6681. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2109

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

JSP March 29, 2007

FRANTZ JULES
SUPERVISORY PATENT EXAMINER

Page 16